CELESTRON®

Model # 31032

FIRSTSCOPE 76 3" NEWTONIAN EQUATORIAL TELESCOPE

Model # 31044

FIRSTSCOPE 114 EQ 4.5" NEWTONIAN TELESCOPE

Model # 31041

FIRSTSCOPE 114 SHORT 4.5" NEWTONIAN EQUATORIAL TELESCOPE

INSTRUCTION MANUAL

Equatorial Model

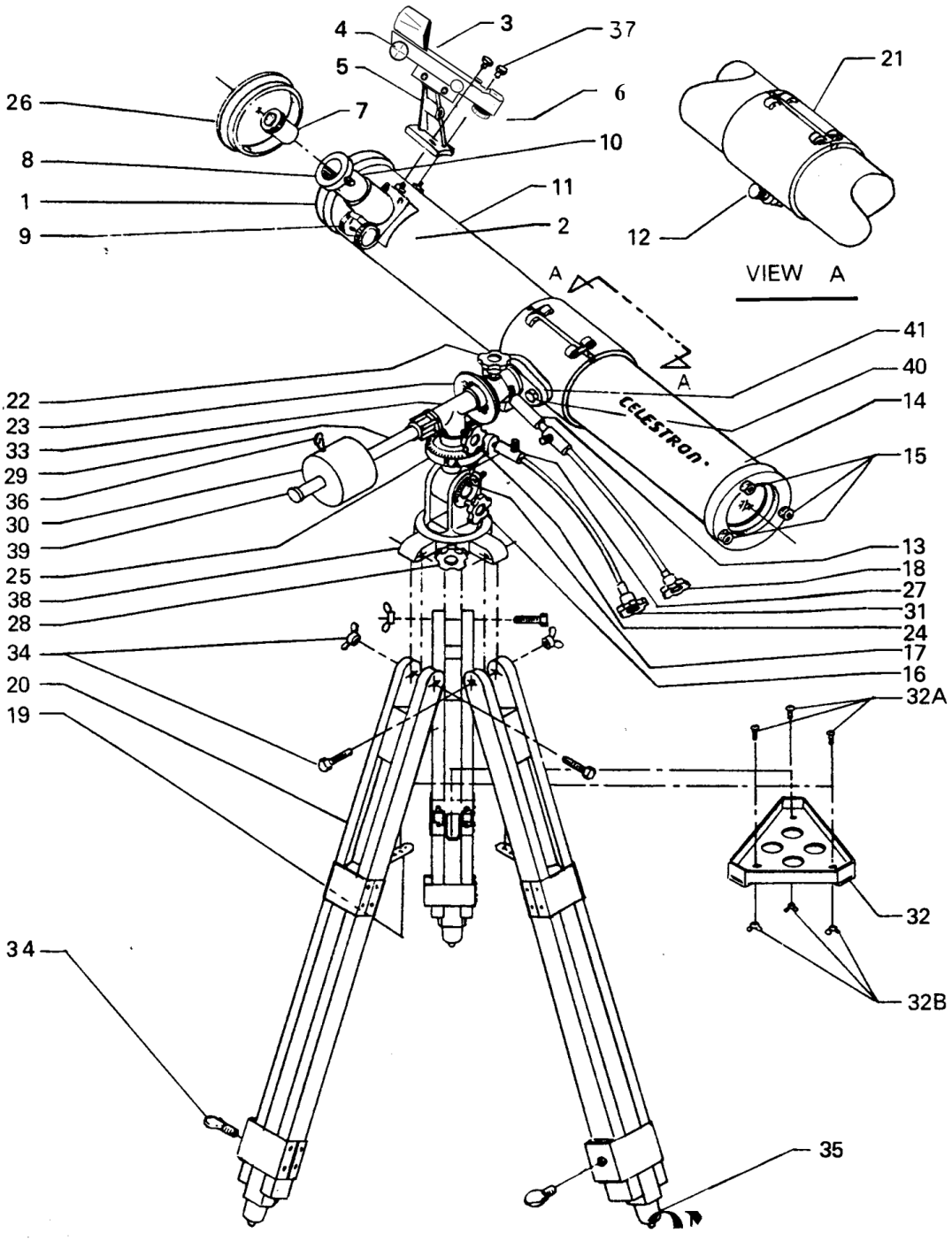


Figure 1

IDENTIFYING PARTS OF FIGURE 1

1. Front Cell (open part of tube)
2. Secondary Mirror (inside)
3. Star Pointer Finderscope
4. Star Pointer Adjustment Knob (Altitude)
5. Star Pointer Bracket
6. Star Pointer Adjustment Knob (Azimuth)
7. Eyepiece
8. Eyepiece Adapter
9. Focusing Knob
10. Focusing Tube
11. Telescope Optical Tube
12. Telescope Tube Mounting Hardware
13. Declination Cable Holder
14. Primary Mirror Cell (inside)
15. Collimation Adjustment Screws
16. Polar Axis Knob
17. Latitude Scale
18. Declination Cable
19. Collapsible Center Leg Brace
20. Tripod Legs
21. Telescope Tube Mount Bracket
22. Declination Knob
23. Declination Setting Circle
24. Right Ascension Knob
25. Right Ascension Setting Circle
26. Front Lens Cover
27. Right Ascension Cable Holder
28. Horizontal Adjustment Knob
29. Counterweight Shaft
30. Counterweight
31. Right Ascension Cable
32. Tripod Accessory Tray
33. Equatorial Mount
34. Tripod Mounting Hardware
35. Tripod Leg Tips
36. Counterweight Lock
37. Finderscope Bracket Mounting Screws
38. Tripod Head
39. Safety Washer for Counterweight
40. Bolts for Tube Mount Bracket
41. Saddle Bracket

1. INTRODUCTION

Thank you for purchasing this Celestron Newtonian Telescope. This telescope is a precision scientific instrument. With it you will enjoy numerous objects in the sky—planets, nebulae, star clusters, galaxies and other astronomical objects.

This manual covers both the 76mm equatorial mount model and the 114mm models. The equatorial mount contains setting circles and slow motion cables to make it easier to locate and track astronomical objects.

But, before your journey begins take time to read this manual to familiarize yourself with the operation and parts of your telescope.

WARNING—NEVER LOOK AT THE SUN WITH YOUR TELESCOPE OR ITS FINDERSCOPE. PERMANENT AND IRREVERSIBLE EYE DAMAGE MAY RESULT AS WELL AS DAMAGE TO YOUR TELESCOPE. HOWEVER, YOU MAY ENJOY LOOKING AT THE SUN IF YOU HAVE A SAFE METHOD OF DOING SO, SUCH AS A CELESTRON SOLAR FILTER.

2. TELESCOPE ASSEMBLY

Please refer to Figure 1 (and the identifying parts list) as you assemble the telescope.

A. The telescope and all items are packed in one box. Included with all models are:

- Telescope Optical Tube
- German Equatorial Mount
- Adjustable Tripod
- Star Pointer Finderscope and Bracket
- Counterweight Shaft and Counterweight
- Tripod Accessory Tray
- Declination Cable
- Right Ascension Cable
- 20mm Eyepiece - 1¼"
- 10mm Eyepiece - 1¼"
- *The Sky*® CD-ROM

To set up the tripod, locate the German equatorial mount, the tripod legs, the tripod mounting hardware and the tripod accessory tray.

1. Extend the center portion (#35) of each of the three tripod legs down 6-8".
2. Use the three tightening screws (#34) to secure each of the extended legs by threading these screws through the holes in the brackets at the bottom of each leg. It is important that you extend the legs before the equatorial mount is attached, otherwise the inner legs may become difficult to slide down. Fine tuning of the tripod height can be done later, and the tightening screws can be adjusted to secure the telescope at the desired height

3. Slide the two top portions of each tripod leg around the sides of each flange on the tripod head (#38) of the equatorial mount, so the flange is secured between them.
4. Slide the screw through the tripod leg and flange, until the screw extends out the other side.
5. Slide the washer and the nut over the screw and tighten. This can be left slightly loose, to allow for positioning the legs later, when attaching the accessory tray.
6. Repeat this process for the remaining two legs. Now the tripod will stand by itself.

You are now ready to attach the tripod accessory tray.

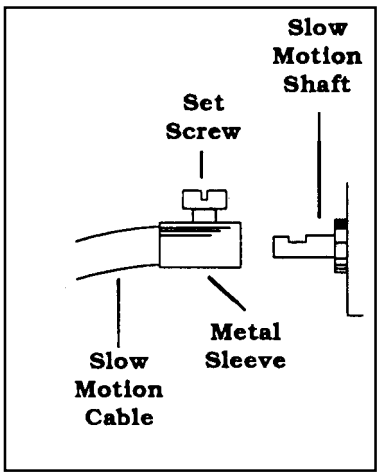
7. The tripod tray fits over the holes in the tripod leg brace. Insert the winged bolts through the holes in the bottom of the tripod leg brace and thread them into the holes in the accessory tray. Tighten all bolts to ensure proper stability to the mount.

B. Before proceeding further, locate Right Ascension (#24) and Declination knobs (#22) and tighten them finger tight.

1. Locate the declination cable holder (#13). Locate the declination cable (the shorter of the two cables) and attach the cable (#18) to the cable holder by tightening the thumb screw on the cable end. The thumb screw should be tightened down hard on the flat surface of the cable holder after backing off the cable about 1/4" from being fully engaged. This method helps ensure there is no slippage when using the cable.

2. You may reverse the position orientation of the Declination cable to suit your preference if desired.

3. Locate the right ascension cable holder (#27). Locate the right ascension cable (#31) and attach it the same way as the declination cable was attached in the last section.



Before mounting the optical tube, the counterweight must be attached to the mount:

1. Slide the counterweight shaft (#29) through the counterweight (#30). Use the counterweight lock to lock the counterweight in place. By holding the counterweight in one hand, thread the counterweight shaft clockwise into the equatorial mount as shown in figure 1.

C. Now you are going to put the telescope optical tube (#11) onto the equatorial mount. For models #31041 and #31044:

1. Slightly loosen the screws that hold the mounting rings on the telescope in place.

2. Slide the rings apart so that each is at the same distance as the holes in the mounting platform.

3. Place the telescope tube on the mount so that the flat portion of the tube rings rest on the mounting platform.

4. Align the holes on the square extrusions with the holes at the ends of the mounting platform.

5. Starting with the ring closest to the focuser end of the tube, insert the bolt through the hole in the mounting platform and thread it into the mounting ring. Repeat this process for the remaining mounting ring.

6. Tighten the screws that hold the mounting rings in place. This will keep the telescope from sliding back and forth in the mounting rings.

For Model #31032:

1. Remove the nuts from the tube mounting screws located on the bottom of the optical tube. Put the bolts from the tube into the holes in the bracket at the top of the mount and tighten the nuts.

D. To attach the Star Pointer Finderscope:

1. Remove the nuts from the studs where the finderscope will mount (#37).

2. Mount the Star Pointer bracket by placing the bracket over the studs protruding from the tube and tightening it down with the supplied nuts. Orient the Star Pointer so that the glass window is facing towards the front of the tube (see Figure 1).

E. Put a low power eyepiece (#7) into the eyepiece adapter and tighten the thumb screw to hold it in place. The focuser comes with a protective dust cap that must be removed before installing an eyepiece. Remove the dust cap by first removing the focuser thumb screw and pulling the cap out from the eyepiece opening.

F. The optical tube also comes with a protective dust cover (#26) that must be remove before using the telescope. To remove the cover, pull the cap straight out from inside opening of the tube.

3. TELESCOPE OPERATION — GETTING SET UP

In order to use the equatorial mount's setting circles, the mount must first be aligned with the earth's axis of rotation.

A. Loosen the polar axis knob (#16) with one hand while holding the equatorial mount with the other hand. Turn the latitude adjustment knob located at the rear of the mount to adjust the angle of the mount. Look at the latitude scale (#17) and move the mount to the latitude of your location and then tighten the polar axis knob. This only has to be done once unless you take the telescope to a different location. For example, Los Angeles, California is located at about 34º. If you do not know your latitude, it can be found on most road atlases of your area.

B. To change the direction your telescope is pointing:

1. To move the telescope in declination (north/south) there are two options. For large and quick movements, release the declination knob (#22) and then tighten the knob when you are near the position you want. For very small movements and fine adjustments, use the declination cable (#18). The declination cable has a range of about 30° and if you come to the stop at the end then overshoot your target by releasing the declination knob and move the telescope in declination. Then tighten the knob and reverse the direction of the declination cable. **Do not try to force movement when the declination cable has reached the stop.**

2. To move the telescope in right ascension (east/west) there are two options. For large and quick movements, release the right ascension knob (#24) and then tighten the knob when you are near the position you want. For very small movements and fine adjustments, use the right ascension cable (#31).

C. The telescope should be properly balanced in order for it to move smoothly in both axes. Proper balance is essential if using an optional motor drive for accurate tracking.

1. To balance the right ascension axis, move the counterweight shaft so it is parallel (horizontal) to the ground. Slowly release the right ascension knob (#24) and see if the optical tube moves. If the optical tube moves, then slide the counterweight up or down the counterweight shaft until the optical tube remains stationary in the parallel position to the ground. When this happens, make sure the counterweight lock is tight.

D. To quickly move the telescope around horizontally

1. Loosen the horizontal adjustment knob (#28), move the telescope to the position desired and then tighten the knob.

F. To align the Star Pointer finderscope:

The Star Pointer is the quickest and easiest way to point your telescope exactly at a desired object in the sky. It's like having a laser pointer that you can shine directly onto the night sky. The Star Pointer is a zero magnification pointing tool that uses a coated glass window to superimpose the image of a small red dot onto the night sky. While keeping both eyes open when looking through the Star Pointer, simply move your telescope until the red dot, seen through the Star Pointer, merges with the object as seen with your unaided eye. The red dot is produced by a light-emitting diode (LED); it is not a laser beam and will not damage the glass window or your eye. The star pointer is powered by a long life 3-volt lithium battery (#CR2032) located underneath the front portion of the Star Pointer. Like all finderscopes, the Star Pointer must be properly aligned with the main telescope before it can be used. This is a simple process using the azimuth and altitude control knobs located on the side and bottom of the Star Pointer. The alignment procedure is best done at night since the LED dot will be difficult to see during the day.

1. To turn on the Star Pointer, rotate the variable brightness control clockwise until you here a "click". To increase the brightness level of the red dot, continue rotating the control knob about 180º until it stops.

2. Locate a bright star or planet and center it in a low power eyepiece in the main telescope.

3. With both eyes open, look through the glass window at the alignment star.

4. If the Star Pointer is perfectly aligned, you will see the red LED dot overlap the alignment star. If the Star Pointer is not aligned, take notice of where the red dot is relative to the bright star.

5. Without moving the main telescope, turn the Star Pointer's azimuth and altitude alignment controls (#4 & #6) until the red dot is directly over the alignment star.

If the LED dot is brighter than the alignment star, it may make it difficult to see the star. Turn the variable brightness control counterclockwise, until the red dot is the same brightness as the alignment star. This will make it easier to get an accurate alignment. The Star Pointer is now ready to be used . **Remember to always turn the power off after you have found an object. This will extend the life of both the battery and the LED.**

4. UNDERSTANDING THE SKY

A. The Celestial - Coordinate System.

The celestial-coordinate system is an imaginary projection of the Earth's geographical coordinate system onto the celestial sphere which seems to turn overhead at night. This celestial grid is complete with equator, latitudes, longitudes and poles.

The Earth is in constant motion as it rotates on its axis. Actually the celestial-coordinate system is being displaced very slowly with respect to the stars. This is called precession and is caused by gravitational influences from the Sun, Moon and other celestial bodies.

The celestial equator is a full 360º circle bisecting the celestial sphere into the northern celestial hemisphere and the southern celestial hemisphere Like the Earth's equator, it is the prime parallel of latitude and is designated 0º.

The celestial parallels of latitude are called "coordinates of declination (Dec.)", and like the Earth's latitudes they are named for their angular distances from the equator. These distances are measured in degrees, minutes and seconds of arc. There are 60 minutes of arc in each degree, and 60 seconds of arc in each arc minute. Declinations north of the celestial equator are "+" and declinations south are "-". The north pole is +90 and the south pole is -90 .

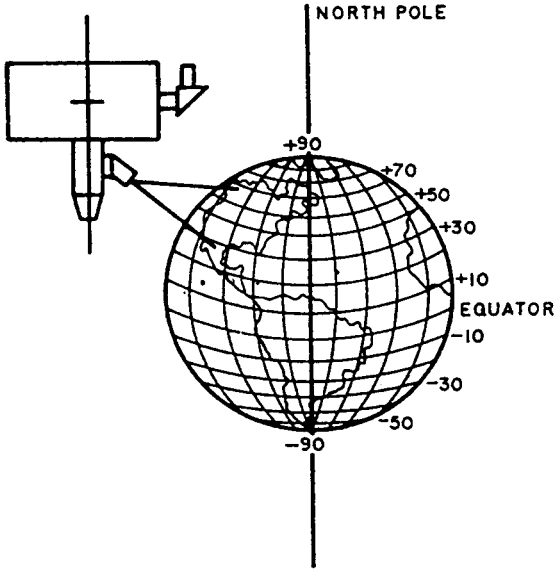


Figure 2

The celestial meridians of longitude are called "coordinates of right ascension (R.A.)", and like the Earth's longitude meridians they extend from pole to pole. There are 24 major R.A. coordinates, evenly spaced around the 360º equator, one every 15º. Like the Earth's longitudes, R.A. coordinates are a measure of time as well as angular distance. We speak of the Earth's major longitude meridians as being separated by one hour of time because the Earth rotates once every 24 hours (one hour = 15°). The same principle applies to celestial longitudes since the celestial sphere appears to rotate once every 24 hours. Right ascension hours are also divided into minutes of arc and seconds of arc, with each hour having 60 minutes of arc and each arc minute being divided into 60 arc seconds.

Astronomers prefer the time designation for R.A. coordinates even though the coordinates denote locations on the celestial sphere, because this makes it easier to tell how long it will be before a particular star will cross a particular north-south line in the sky. So, R.A. coordinates are marked off in units of time eastward from an arbitrary point on the celestial equator in the constellation Pisces. The prime R.A. coordinate which passes through this point is designated "O hours O minutes O seconds". We call this reference point the vernal equinox where it crosses the celestial equator. All other coordinates are names for the

number of hours, minutes and seconds that they lag behind this coordinate after it passes overhead moving westward.

Given the celestial coordinate system, it now becomes possible to find celestial objects by translating their celestial coordinates using telescope pointing positions. For this you use setting circles (if you have the Firstscope EQ - equatorial mount models) for R.A. and Dec. to find celestial coordinates for stellar objects which are given in star charts and reference books.

B. Polar Alignment

To make tracking the stars easier, rough polar alignment is required.

1. The right ascension (polar) axis should be pointed towards the North Pole (see the illustration below).

2. The equatorial mount should be level.

3. Your latitude should be set (see 3.A).

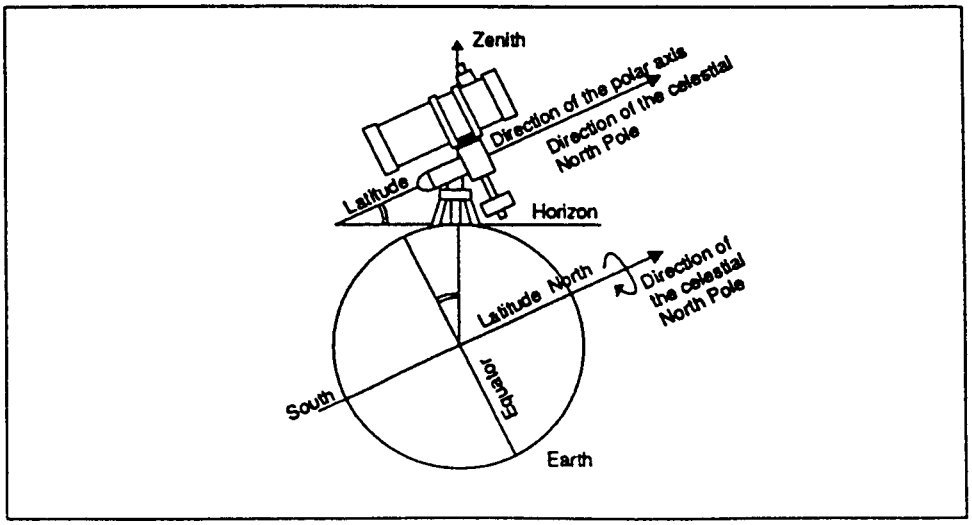
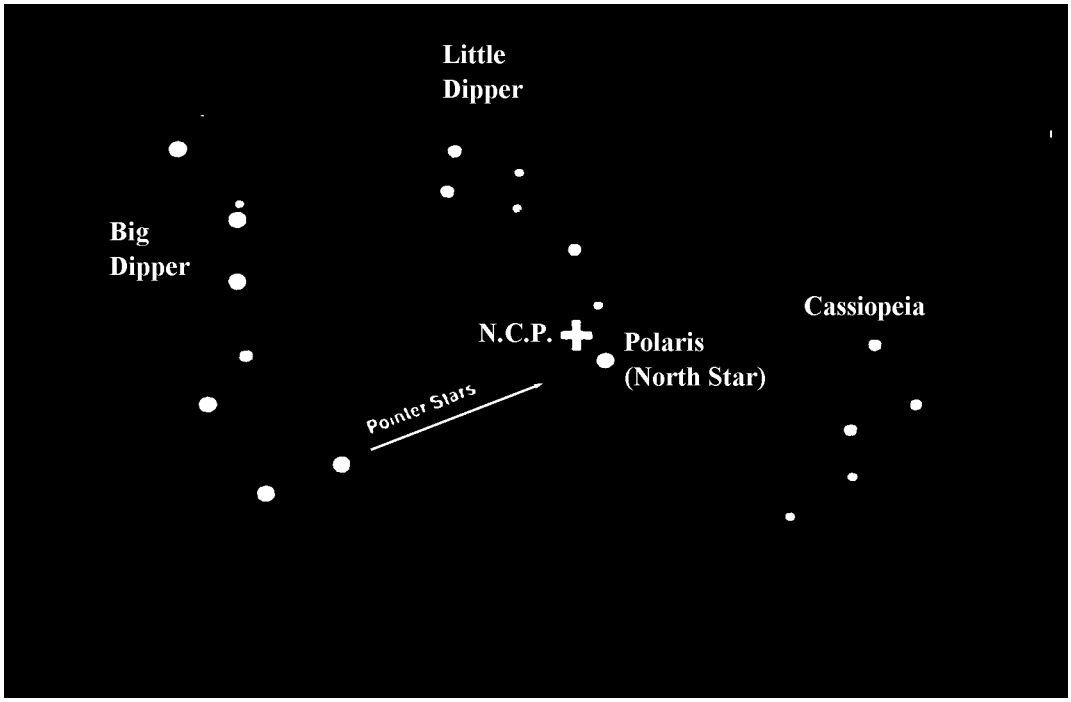


Figure 3



4. To find astronomical objects, you will now mainly use the right ascension axis as the polar alignment virtually eliminates needed adjustments in the declination axis.

To track objects continuously, adjustments will be made with the right ascension cable.

When using the telescope, all objects in the sky will slowly drift out of the field of view unless you manually make corrections with the right ascension cable.

5. The above method of polar alignment is adequate for casual observing. More precise methods of polar alignment are available and most astronomy texts or telescope books describe the procedures.

6. If you look at the North Star after this polar alignment procedure, your declination setting circle (#23) should read 90° (the actual is 89.2°).

C. Using the Setting Circles

Setting Circles are dials (or gauges) for right ascension and declination that allow you to locate celestial objects easily from their coordinates as listed in a star chart or atlas.

1. The declination setting circle is scaled in degrees and the right ascension setting circle is incremented in minutes. The circles will get you close to your target but not directly on it. Also, the accuracy of your polar alignment will affect how accurate your setting circles read.

2. The declination setting circle is factory set and should not need any adjustment if it reads accurately.

3. The right ascension setting circle (#25) must be aligned. Choose a bright and easy to find star in a star chart and note the coordinates (right ascension and declination). Find the star in the Star Pointer and

then in the telescope. Now, rotate the right ascension circle to match the coordinates of the star with the indicator mark.

4. The right ascension setting circle does not move as the telescope moves in right ascension and thus it must by aligned each time you want to use it to find a new object. However, you do not need to use a bright star each time but you can use the object you are currently observing.

5. Now, using a star chart or atlas you can find numerous objects. First move the telescope in declination to the correct declination coordinate. Then move the telescope in right ascension until the indicator points to the correct coordinate.

6. After moving the telescope to the correct celestial coordinates, look through the lower power eyepiece to see if you have located the object you wish to view. Center the object in eyepiece. If the object is not visible in the eyepiece, gradually pan the telescope, using the right ascension and declination cables, until the object is visible.

5. MAGNIFICATION (POWER)

The magnification (or power) of a telescope is variable depending upon the focal length of the eyepiece being used along with the focal length of the telescope.

A. If you purchased one of the 76mm diameter models, your telescope has a focal length of 700mm.

   To calculate the magnification we use the following formula:

$$Magnification = \frac{FL(telescope)}{FL(eyepiece)}$$

   where FL(telescope) is the focal length of the telescope and FL(eyepiece) is the focal length of the eyepiece. So, if you use a 10mm eyepiece your magnification is 700/10 = 70x.

   There are numerous optional eyepieces that are available to expand your range of magnification. There are various types of eyepieces of varying quality to choose from.

B. Magnification through the telescope has its limits. These limits are determined by the laws of optics and the nature of the human eye. The maximum usable power is equal to 60 times the aperture of the telescope (in inches). For example, if you purchased the 114mm model (4.5") then your maximum useful power is 270x (4.5" x 60). You can create power higher than this limit but the images will be dark and blurred with poor contrast.

   The maximum power is used only under ideal conditions which are not common. Most of your viewing will be done in the range of 25x to 120x. Higher powers are used mainly for lunar and planetary observing under ideal seeing conditions.

6. TELESCOPE OPERATION — ASTRONOMICAL OBSERVING

After you have read and followed the instruction manual to this point, the telescope is set up and you are ready to begin your observing adventure.

To enable you to find objects you should have a set of Star Charts or a Planisphere. The location of the planets may appear in local newspapers.

A. The Moon is an awesome first object to observe. The best observing occurs during the partial phases as a full Moon is too bright.

At low power you can see the complete Moon and at high powers you can see lunar details such as mountain ranges, craters and rills.

B. Five of the planets are easy targets for your telescope.

- See Jupiter with its great red spot, study the cloud bands and watch its moons shuttle back and forth.
- Study Saturn and its splendid ring structure.
- Observe Mars and see its polar cap.
- Watch Venus and Mercury as they go through their moon-like phases.

C. **The Sun is quite safe to view if you use the proper solar filter. You can detect and watch the ever-changing sunspot activity.**

D. Deep-Sky objects (those outside our solar system) offer a lifetime of observing. There are hundreds of objects within the realm of your telescope including open and closed star clusters, planetary and diffuse nebulae, galaxies, double stars and occasional comets. The amount of detail you can see is dependent on your observing site (dark sky rural locations are best), atmospheric conditions, brightness of the object, collimation and your observing experience.

7. TELESCOPE MAINTENANCE

With proper care your telescope should rarely need any maintenance work.

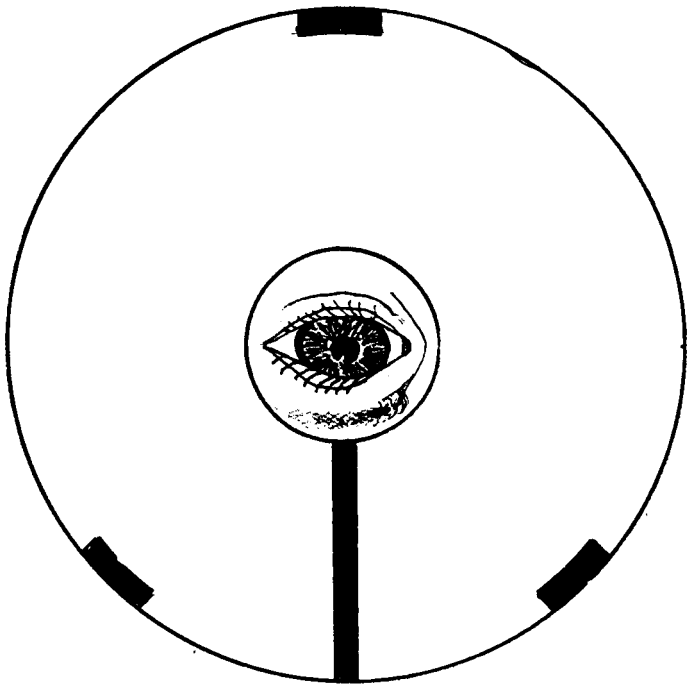
A. When not in use, always replace all lens covers to keep dust and contaminants off the optical surfaces.

B. A small amount of dust on any optical surface is ok. If the dust builds up then use a can of compressed air and then a camel's hair brush to remove the dust.

C. If the mirrors need cleaning, they should be cleaned by a professional. Either have your instrument serviced by a telescope repair facility or return it to the factory.

D. Collimation or alignment of the optical system is done at the factory before shipment.
   1. If your telescope has received very rough handling during transport or is dropped, it may need collimation.

      To check if your telescope is in collimation the sketch below will help you. If you look into the eyepiece adapter (without an eyepiece) at the top of the focuser, this is what you should see. If the reflection of your eye is off center, then collimation is necessary.



2. Adjustments to the collimation of the telescope can be made by turning the collimation adjustment screws (#15) located at the rear of the optical tube.
3. If your telescope is out of collimation, the best way to re-collimate it is with a good collimation tool. Celestron offers a Newtonian Collimation Tool (#94183) with detailed instructions that make it an easy chore.

8. SPECIFICATIONS

	#31032	**#31044**	**#31041**
Optical System:	Newtonian Reflector	Newtonian Reflector	Newtonian Reflector
Aperture:	76mm (3")	114mm (4.5")	114mm (4.5")
Focal Length:	700mm	900mm	1000mm
F/ratio:	f/9	f/8	f/9
Focuser	Rack and Pinion	Rack and Pinion	Rack and Pinion
Standard Oculars (or	20mm 1¼" (35x)	20mm 1¼" (45x)	20mm 1¼" (50x)
Eyepieces)	10mm 1¼" (70x)	10mm 1¼" (90x)	10mm 1¼" (100x)
Resolution	1.5 arc seconds	1.0 arc seconds	1.0 arc seconds
Light gathering Power	118x unaided eye	267x unaided eye	267x unaided eye
Limiting Magnitude	11.9	12.8	12.8
Highest useful Power	180x	270x	270x

NOTE: Specifications are subject to change without notice.

9. OPTIONAL ACCESSORIES

Celestron International offers a wide assortment of optional accessories to expand your interests.

Eyepieces - Like telescopes, eyepieces come in a variety of designs. Each design has its own advantages and disadvantages. For the 1-1/4" barrel diameter there are four different eyepiece designs available.

- **OMNI Plössl -** Plössl eyepieces have a 4-element lens designed for low-to-high power observing. The Plössls offer razor sharp views across the entire field, even at the edges! In the 1-1/4" barrel diameter, they are available in the following focal lengths: 4mm, 6mm, 8mm, 12.5mm, 15mm, 20mm, 25mm, 32mm and 40mm.

- **Ultima -** Ultima is not really a design, but a trade name for our 5-element, wide field eyepieces. In the 1-1/4" barrel diameter, they are available in the following focal lengths: 5mm, 7.5mm, 12.5mm, 18mm, 24mm, 30mm, 35mm, and 42mm. These eyepieces are all parfocal. The 35mm Ultima gives the widest possible field of view with a 1-1/4" diagonal.

Moon Filter (#94119-A) - Celestron's Moon Filter is an economical eyepiece filter for reducing the brightness of the moon and improving contrast, so greater detail can be observed on the lunar surface. The clear aperture is 21mm and the transmission is about 18%.

Motor Drive (#93515) - Motor drives compensate for the earth's rotation keeping an object in the eyepiece field of view. This makes observing much more enjoyable and eliminates the constant use of the manual cables. Models available for all equatorial mounts.

Planisphere (#93720) - A simple and inexpensive tool for all levels of observers, from naked eye viewers to users of highly sophisticated telescopes. The Celestron Planisphere makes it easy to locate stars for observing and is a great planet finder as well. A map of the night sky, oriented by month and day, rotates within a depiction of the 24 hours of the day, to display exactly which stars and planets will be visible at any given time. Ingeniously simple to use, yet quite effective. Made of durable materials and coated for added protection. Celestron Planispheres come in three different models, to match the latitude from which you're observing:

Solar Filters (#94133) - The Celestron AstroSolar® filters are safe and allow you to see sunspots as they move across the solar disk. Models available for 76mm and 114mm (#94134) telescopes.

T-Adapter (#94177) - T-Adapter (with additional T-Ring) allows you to attach your SLR camera to the rear cell of your Celestron telescope. This turns your telescope into a high power telephoto lens perfect for terrestrial photography and short exposure lunar and filtered solar photography.

A full description of all Celestron accessories can be found in the Celestron Accessory Catalog (#93685).

CELESTRON TWO YEAR WARRANTY

A. Celestron warrants this telescope to be free from defects in materials and workmanship for two years. Celestron will repair or replace such product or part thereof which, upon inspection by Celestron, is found to be defective in materials or workmanship. As a condition to the obligation of Celestron to repair or replace such product, the product must be returned to Celestron together with proof-of-purchase satisfactory to Celestron.

B. The Proper Return Authorization Number must be obtained from Celestron in advance of return. Call Celestron at (310) 328-9560 to receive the number to be displayed on the outside of your shipping container.

All returns must be accompanied by a written statement setting forth the name, address, and daytime telephone number of the owner, together with a brief description of any claimed defects. Parts or product for which replacement is made shall become the property of Celestron.

The customer shall be responsible for all costs of transportation and insurance, both to and from the factory of Celestron, and shall be required to prepay such costs.

Celestron shall use reasonable efforts to repair or replace any telescope covered by this warranty within thirty days of receipt. In the event repair or replacement shall require more than thirty days, Celestron shall notify the customer accordingly. Celestron reserves the right to replace any product which has been discontinued from its product line with a new product of comparable value and function.

This warranty shall be void and of no force of effect in the event a covered product has been modified in design or function, or subjected to abuse, misuse, mishandling or unauthorized repair. Further, product malfunction or deterioration due to normal wear is not covered by this warranty.

CELESTRON DISCLAIMS ANY WARRANTIES, EXPRESS OR IMPLIED, WHETHER OF MERCHANTABILITY OF FITNESS FOR A PARTICULAR USE, EXCEPT AS EXPRESSLY SET FORTH HEREIN.

THE SOLE OBLIGATION OF CELESTRON UNDER THIS LIMITED WARRANTY SHALL BE TO REPAIR OR REPLACE THE COVERED PRODUCT, IN ACCORDANCE WITH THE TERMS SET FORTH HEREIN. CELESTRON EXPRESSLY DISCLAIMS ANY LOST PROFITS, GENERAL, SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES WHICH MAY RESULT FROM BREACH OF ANY WARRANTY, OR ARISING OUT OF THE USE OR INABILITY TO USE ANY CELESTRON PRODUCT. ANY WARRANTIES WHICH ARE IMPLIED AND WHICH CANNOT BE DISCLAIMED SHALL BE LIMITED IN DURATION TO A TERM OF TWO YEARS FROM THE DATE OF ORIGINAL RETAIL PURCHASE.

Some states do not allow the exclusion or limitation of incidental or consequential damages or limitation on how long an implied warranty lasts, so the above limitations and exclusions may not apply to you.

This warranty gives you specific legal rights, and you may also have other rights which vary from state to state.

Celestron reserves the right to modify or discontinue, without prior notice to you, any model or style telescope.

If warranty problems arise, or if you need assistance in using your telescope contact:

Celestron
Customer Service Department
2835 Columbia Street
Torrance, CA 90503
Tel. (310) 328-9560
Fax. (310) 212-5835
Monday-Friday 8AM-4PM PST

This warranty supersedes all other product warranties.

NOTE: This warranty is valid to U.S.A. and Canadian customers who have purchased this product from an Authorized Celestron Dealer in the U.S.A. or Canada. Warranty outside the U.S.A. and Canada is valid only to customers who purchased from a Celestron Distributor or Authorized Celestron Dealer in the specific country and please contact them for any warranty service.

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